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REMARKS

Reconsideration is requested in the above application.

On February 14, 2003, the examiner, the undersigned and representatives of the assignee, Mr. David Baggett and Mr. Gregory Galpern conducted a telephonic interview. Discussed was claim 1 and how claim 1 distinguished over the cited art. No agreement was reached. Applicant did point out to the examiner differences between claim 1 and the cited references pertaining to the condition or criterion used for managing the cache as recited in claim 1. The examiner kindly indicated possible favorable reconsideration based on further defining this feature of the invention in the claims.

Applicants have filed this Preliminary Amendment and accompanying Request for Reconsideration to allow the examiner to reconsider and reexamine the claims in light of the telephonic interview.

The remarks below address the rejections made in the final office action.

The Examiner rejected claims 1-32 under 35 U.S.C. 103(a) as being unpatentable over Walker et al., U.S. Patent 5,897,620 in view of Bierma et al., U.S. Patent 5,758,149.

Applicant has amended claim 1 to more particularly point out Applicant's invention. Applicant's claim 1, as now amended recites determining, based on a criterion for availability information, which criterion is determined based on needs of a travel planning system that makes queries to the cache for obtaining seat availability information, whether a stored answer in the cache is stale. This element is neither described nor suggested by Walker, taken separately or in combination with Bierma. Claim 1 further recites if the stored answer is stale, sending an availability query to an source of availability information for the airline based on determining that the answer was stale. This feature is also not suggested by the references.

The Examiner takes the position with respect to claim 1 that Walker discloses a data processing system for determining the availability of seats on a particular airline flight and uses Bierma to teach caching of availability information.

Walker teaches to access a conventional yield management system used by airlines to allocate seats amongst fare classes. The availability technique, which Walker discloses is the

actual querying of an availability system for availability data in order to satisfy a request to see if a travel option is available.

Thus, while Walker describes sending an actual availability query to a source of availability information, Walker does not describe a cache and a technique to manage the cache. The Examiner notes that Walker does not disclose a cache for maintaining entries for seat availability and uses Bierma for disclosing an analogous system for suggesting that caches are well-known repositories for storing or maintaining data concerning airline seat availability, referencing column 1, lines 41-46, column 3, lines 27-32 et seq.

Applicant disagrees that Bierma discloses any analogous system to that recited in Applicant's claim 1. Claim 1 now clearly recites determining, based on a criterion for availability information, which criterion is determined based on needs of a travel planning system that makes queries to the cache for obtaining seat availability information, whether a stored answer in the cache is stale. Bierma does not suggest a technique to populate a cache based on a criterion for availability information with the criterion determined based on needs of a travel planning system that makes queries to the cache seat availability information.

Bierma is directed to a problem of how to allow both query and transaction processing against the same copy of a database. Bierma accomplishes this by using a buffer scheme to temporarily store a portion of a database that is being accessed by a query so that transaction processing is not affected. These teaches do not suggest to one of skill in the art a technique to populate a cache based on a criterion for availability information with the criterion determined based on needs of a travel planning system that makes queries to the cache seat availability information.

Moreover, Applicant maintains there is no suggestion to combine the teachings of Walker with Bierma to render obvious Applicant's invention since neither Walker nor Bierma relate to the problem being solved by Applicant's invention, namely, managing a cache to avoid the unnecessary querying of an airline's availability system for airline availability information.

Applicant's claim 1 recites a technique to manage entries in the cache and to determine when the entries in the cache need to be updated by an actual availability query because the answer was considered stale. However, this teaching is totally lacking in Bierma. Walker

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clearly does not provide the missing teaching either. Applicant's claim 1 thus distinguishes over Walker and Bierma.

Claim 5 was amended to call for a cache manager that manages a quality level of entry information in the cache by proactively populating the cache to maintain a high quality level of entries of availability information in the cache, with the quality level determined by comparing entries in the cache to criterion related to needs of a travel planning system that makes queries to the cache for obtaining seat availability information. For similar reasons as discussed above, this claim distinguishes over Walker and Bierma.

Claim 19 was amended to call for... instructions to ...determine whether a stored answer in the cache is stale, based on a determined criterion for availability information, which criterion is determined based on needs of a travel planning system that makes queries to the cache for obtaining seat availability information.... .

For similar reasons as discussed above this claim is also allowable.

Claim 23 was amended to call for ... instructions to ... manage entry information in the cache using criterion determined based on needs of a travel planning system that makes queries to the cache for seat availability information, to determine when an entry in the cache should be added, deleted or modified.

For similar reasons as discussed above this claim is also allowable.

Claim 30 recites ... determining, which entries to add, delete, or update in the cache by monitoring and examining availability queries made to the cache by a travel planning system to determine which flights have a high demand for availability information and updating entries in the cache based on if a flight is determined to have a higher than average or higher than expected demand. These features are not suggested by Walker or Bierma. While Walker describes sending an actual availability query to a source of availability information, Walker does not describe a cache and managing the cache. Bierma while disclosing a cache database, does not suggest to populate a cache based monitoring and examining availability queries made to the cache by a travel planning system to determine which flights have a high demand for availability information and updating entries in the cache based on if a flight is determined to have a higher than average or higher than expected demand. This is not suggested by a reference that updates based having current data from a database stored in the cache as Bierma discloses.

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Applicant's dependent claims add further distinct features to the invention as generally argued of record and are at least allowable due to their dependency on allowable base claims.

The art cited but not applied is seen as neither describing nor suggesting applicant's invention whether taken separately or in combination with the art of record.

Accordingly, in view of the above amendments and remarks, it is submitted that the case is now in condition for allowance and such action is respectfully requested.